(12) INTERNATIONAL APPLICATION PUBLISHED UNDER THE PATENT COOPERATION TREATY (PCT)

(19) World Intellectual Property Organization

International Bureau



1 CENTRA CENTRA CONTRACTOR DE SENTE CONTRACTOR DE CONTRACTOR DE CONTRACTOR DE CONTRACTOR DE CONTRACTOR DE CONT

(43) International Publication Date 15 July 2004 (15.07.2004)

PCT

(10) International Publication Number WO 2004/059391 A1

(51) International Patent Classification⁷: 7/039

G03F 7/004.

(21) International Application Number:

PCT/JP2003/016267

(22) International Filing Date:

18 December 2003 (18.12.2003)

(25) Filing Language:

English

(26) Publication Language:

English

(30) Priority Data:

2002-373936

25 December 2002 (25.12.2002) JP

2003-355418

15 October 2003 (15.10.2003) J

- (71) Applicant (for all designated States except US): TOKYO OHKA KOGYO CO., LTD. [JP/JP]; 150, Nakamaruko, Nakahara-ku, Kawasaki-shi, Kanagawa 211-0012 (JP).
- (72) Inventors; and
- (75) Inventors/Applicants (for US only): TAKESHITA, Masaru [JP/JP]; c/o Tokyo Ohka Kogyo Co., Ltd., 150, Nakamaruko, Nakahara-ku, Kawasaki-shi, Kanagawa 211-0012 (JP). MIYAIRA, Miwa [JP/JP]; c/o Tokyo Ohka Kogyo Co., Ltd., 150, Nakamaruko, Nakahara-ku, Kawasaki-shi, Kanagawa 211-0012 (JP). HADA, Hideo [JP/JP]; c/o Tokyo Ohka Kogyo Co., Ltd., 150, Nakamaruko, Nakahara-ku, Kawasaki-shi, Kanagawa 211-0012 (JP). IWAI, Takeshi [JP/JP]; c/o Tokyo Ohka Kogyo

Co., Ltd., 150, Nakamaruko, Nakahara-ku, Kawasaki-shi, Kanagawa 211-0012 (JP).

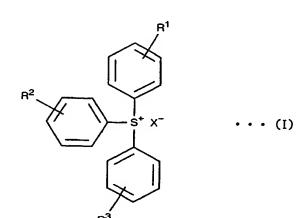
- (74) Agents: TANAI, Sumio et al.; 2-3-1, Yaesu, Chuo-ku,, Tokyo 104-8453 (JP).
- (81) Designated States (national): AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, KE, KG, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW.
- (84) Designated States (regional): ARIPO patent (BW, GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW), Eurasian patent (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European patent (AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO, SE, SI, SK, TR), OAPI patent (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).

Published:

- with international search report
- before the expiration of the time limit for amending the claims and to be republished in the event of receipt of amendments

For two-letter codes and other abbreviations, refer to the "Guidance Notes on Codes and Abbreviations" appearing at the beginning of each regular issue of the PCT Gazette.

(54) Title: RESIST COMPOSITION AND METHOD OF FORMING RESIST PATTERN USING SAME



(57) Abstract: There are provided a resist composition that produces a resist pattern of good shape, and a method of forming a resist pattern that uses such a resist composition. The resist composition comprises a resin component (A) that undergoes a change in alkali solubility under the action of acid, an acid generator component (B) that generates acid on exposure, and an organic solvent (C), wherein the component (B) comprises a compound represented by a general formula (I) shown below [wherein, R¹ to R³each represent, independently, a methyl group or an ethyl group; and X⁻ represents an anion].

